| Inde | <br>Claims |  |
|------|------------|--|
|      |            |  |

Rejected

Allowed

| Application/Control No. | Applicant(s)/Patent under Reexamination |  |
|-------------------------|---|--|
| 10/608,717              | SCHWARZ, RALPH                          |  |
| Examiner                | Art Unit                                |  |
| Robert A. Hopkins       | 1724                                    |  |

| _ | (Through numeral)<br>Cancelled | N | Non-Elected  |
|---|--------------------------------|---|--------------|
| ÷ | Restricted                     | _ | Interference |

| A | Appeal   |
|---|----------|
| 0 | Objected |

| Cla         | aim         | Г        |              | -  | D        | ate      | ;         | -              |                 | $\neg$   | C            | aim      | Т              |                         |                         |   | D  | ate   |                         | _   |   |           |     | Cla   | aim        |          |                 |          | (        | Date                                | •        |          |          |          |
|-------------|-------------|----------|--------------|--|----------|----------|-----------|----------------|-----------------|----------|--------------|----------|----------------|-------------------------|-------------------------|---|--|---|-------------------------|---|---|-----------|-----|-------|------------|----------|-----------------|----------|----------|-------------------------------------|----------|----------|----------|----------|
|             | _           |          |              |  |          |          |           |                |                 |          |              | Τ,       | $\Box$         |                         | Т                       |   | 1  |   | Т                       | T   |   |           |     |       | <u></u>    |          |                 |          |          |                                     |          |          |          |          |
| Final       | Original    | 8/29/05  |              |  |          |          |           |                |                 |          | Final        | Original |                | ı                       |                         |   |  |   | - 1                     |   |   |           | - 1 | Final | Original   |          |                 | l        |          |                                     |          |          |          |          |
| iĒ          | <u>`</u> €' | 32       |              |  | -        |          |           |                |                 |          | i走           | غ ا      | <u>"</u>       |                         |                         |   |  |   | - 1                     |   |   |           | - 1 | ίΞ    | Ç          |          |                 |          |          | ŀ                                   |          |          |          |          |
| l _         | 0           |          |              |  |          |          |           |                |                 |          |              |          |                |                         |                         |   |  |   |                         | L   |   | ╝         | L   |       |            |          |                 | L        | L        |                                     |          |          |          | •        |
|             | 1           | 1        |              |  |          |          |           |                |                 |          |              | 5        | 1              | ┸                       | $\perp$                 |   |  | $\perp$   | ┙                       | $oldsymbol{\perp}$                                |   | ╛         | - [ |       | 101        |          |                 | L        | L        |                                     |          |          |          |          |
|             | 2           | 1        | $\perp$      | $\perp$  | $\perp$  | $\Box$   | _         |                | Ш               | 凵        |              | 5        |                | ↓                       | ᆚ                       |   |  | $\bot$  | _                       | $\perp$   | ᆚ   | _         | Į   |       | 102        | _        |                 | ᆫ        | L        | $ldsymbol{ldsymbol{ldsymbol{eta}}}$ | Ш        |          | _        | _        |
|             | -9-         |          |              | $\bot$   |          | $\Box$   |           |                | Ш               | _        |              | 5        |                | $\perp$                 | ᆚ                       | ᆚ   | $\perp$  | _   | _                       | $\perp$   | $\perp$   | ╝         | L   |       | 103        | L        |                 | L        | _        |                                     |          |          | _        |          |
|             | 4           | 0        | $\perp$      | ┙  | $\dashv$ | _        |           |                |                 | [        |              | 5        |                | 丄                       | $\perp$                 | 4   | 4  | 4   | 4                       | 4   | 4   | _         | Į   |       | 104        | <u> </u> |                 | L.       | <u> </u> |                                     |          | $\Box$   | _        |          |
| <u></u>     | 5           | 0        | _            | ┙  | _        | _        | _         |                | Ш               | _        |              | 5        |                | ┸                       | _                       | $\perp$   | 4  | 4   | 4                       | _   | 1   | 4         | ļ   |       | 105        | _        |                 | L        | L        | lacksquare                          |          | _        |          |          |
| <u></u>     | 6           | 0        | _            | $\dashv$   | _        | _        | _         | Ш              | Щ               | _        |              | 5        |                | 4_                      | 4                       | $\bot$  | 4  | 4   | _                       | $\perp$   | _   | 4         | Į   |       | 106        |          |                 | ╙        | ╙        |                                     |          | _        | _        | _        |
|             | 7           | 0        | 4            | $\dashv$   | _        | _        |           |                | Ц               | _        |              | 5        |                | 4                       | 4                       | 4   | 4  | 4   | 4                       | $\dashv$  | 4   | 4         | ļ   |       | 107        |          |                 | _        |          |                                     |          | _        | _        |          |
| <u> </u>    | 8           | 0        | 4            | _  | _        | 4        | _         | Ш              | Щ               | _        | <u> </u>     | 5        |                | +                       | 4                       | _   | 4  | 4   | _                       | 4   | -   | 4         | ļ   |       | 108        | _        |                 | <u> </u> | _        | _                                   |          |          | _        |          |
| <u> </u>    | 9           | =        | 4            | _  | _        | _        | _         | Щ              | Ц               | _        | _            | 5        |                | 4                       | +                       | +   | +  | 4   | $\dashv$                | $\dashv$  | 4   | 4         | ŀ   |       | 109        | _        | _               | ļ        | <b> </b> | L                                   |          | $\dashv$ | -        | _        |
| <u> </u>    | 10          | =        | _            | 4  | _        | _        |           |                | $\Box$          |          |              | 6        |                | +                       | +                       | +   | $\dashv$   | 4   | 4                       | $\dashv$  | 4   | 4         | 1   |       | 110        |          |                 | ┡        | ┡        | _                                   |          |          |          | _        |
| <u> </u>    | 11          | 0        | $\dashv$     | 4  | -        |          | $\dashv$  | <u> </u>       |                 |          | <u> </u>     | 6        |                | +                       | +                       | +   | +  | -   | 4                       | +   | +   | $\dashv$  | -   | -     | 111        | $\vdash$ |                 | ⊢        | ⊢        | $\vdash$                            | Ь.,      |          | _        | $\dashv$ |
| <u></u>     | 12          | 0        | $\dashv$     | 4  | -        |          | ᅴ         | Н              | $\vdash \vdash$ | _        | <u> </u>     | 6        |                | +                       | +                       | +   | $\dashv$   |   | -+                      | +   | +   | $\dashv$  | -   |       | 112        | $\vdash$ | $\vdash$        | ⊢        | ⊢        | H                                   | $\vdash$ |          | -        | _        |
| <u> </u>    | 13          | 1        | $\dashv$     | 4  | -        |          | $\dashv$  | Н              | dash            | _        | <u> </u>     | 6        |                | +                       | +                       | +   | +  | +   | $\dashv$                | +   | +   | $\dashv$  | - } |       | 113        | $\vdash$ | $\vdash \vdash$ | Ι—       | ⊢-       | $\vdash$                            | <b></b>  | -        | -        | -        |
| <u> </u>    | 14          | 1        |              | $\dashv$   | $\dashv$ |          |           | Н              | Н               |          | <u> </u>     | 6        |                | +                       | +                       | +   | -+   | +   | $\dashv$                | -   | -   | 4         | ŀ   |       | 114        | H        |                 | -        | <u> </u> | -                                   |          | -        |          | $\dashv$ |
| <u> </u>    | 15          | - 4      | +            |  |          | -        |           | Н              |                 |          | <u> </u>     | 6        |                | +                       | +                       | +   | +  | -+  | +                       | $\dashv$  | +   | $\dashv$  | - } | •     | 115        | $\vdash$ | Н               | $\vdash$ | $\vdash$ | $\vdash$                            | Н        |          |          | -        |
| <u> </u>    | 16          | 1        | $\dashv$     |  | $\dashv$ | $\dashv$ | $\dashv$  | Н              | Н               | 긕        | <u> </u>     | 6        | 7              | +                       | +                       | +   | +  | +   | $\dashv$                | +   | +   | $\dashv$  | -   |       | 116<br>117 | <u> </u> | Н               | $\vdash$ | $\vdash$ |                                     | $\vdash$ | $\vdash$ | $\dashv$ | $\dashv$ |
| ⊢           | 17          | 0        | +            | $\dashv$   | $\dashv$ | $\dashv$ | $\dashv$  | Н              | Н               | $\dashv$ | <u> </u>     | 6        |                | +                       | +                       | +   | +  | +   | $\dashv$                | +   | +   | $\dashv$  | - } |       | 117        | $\vdash$ | $\vdash$        | ├        |          | $\vdash$                            | Н        | $\dashv$ | -        |          |
| ├           | 18<br>19    | 7        | $\dashv$     | $\dashv$   | -        |          | $\dashv$  | $\vdash\vdash$ | Н               | $\dashv$ | $\vdash$     | 6        |                | ┿                       | +                       |   | +  | +   | +                       | +   | +   | $\dashv$  | -   |       | 119        | $\vdash$ | H               | $\vdash$ |          | $\vdash$                            | Н        | ┥        |          | $\dashv$ |
|             | 20          | 0        | +            | $\dashv$   | $\dashv$ |          | $\dashv$  | Н              | $\vdash$        | $\dashv$ | <del> </del> | 7        |                | +                       | +                       | +   | +  | +   | ╌┼                      | +   | +   | $\dashv$  | -   |       | 120        | -        | $\vdash\vdash$  | $\vdash$ | ├ .      | $\vdash$                            | Н        | $\dashv$ | $\dashv$ | $\dashv$ |
|             |             | 7        | +            | $\dashv$   | $\dashv$ | $\dashv$ | $\dashv$  | Н              | Н               |          | ├            | 7        |                | +                       | +                       | +   | +  | +   | +                       | $\dashv$  |   | $\dashv$  | ŀ   |       | 121        | -        | Н               | ┝        | <u> </u> | ┝                                   |          | $\dashv$ | $\dashv$ | -        |
| <u> </u>    | 21          | ľ        | ┰            | -  | $\dashv$ | $\dashv$ | $\dashv$  | $\vdash$       | Н               |          | ⊢            | 7        |                | ┿                       | +                       | +   | +  | +   | $\dashv$                | +   | +   | $\dashv$  | ŀ   |       | 122        | _        | Н               | ⊢        | ⊢        | -                                   | -        | -        | $\dashv$ | $\dashv$ |
| <u> </u>    | 23          | Н        | $\dashv$     | $\dashv$   | $\dashv$ |          |           | $\vdash$       | $\vdash$        | ᅱ        | ├            | 7        |                | +                       | +                       | +   | +  | +   | $\dashv$                | +   | -+-   | $\dashv$  | ŀ   |       | 123        | $\vdash$ |                 | ⊢        | ┢        | ⊢                                   |          |          | $\dashv$ | $\dashv$ |
| <u> </u>    | 24          | Н        | ┰            |  | -        | $\dashv$ | $\dashv$  | Н              | Н               | ᅱ        | ⊢            | 7        |                | +                       | ╫                       | ╁   | +  | $\dashv$  | $\dashv$                | +   | +   | $\dashv$  | ŀ   |       | 124        | $\vdash$ |                 | ⊢        | ⊢        | ┝                                   | -        | $\dashv$ |          |          |
| ⊢           | 25          | $\vdash$ | +            | ᅥ  | -        | $\dashv$ | $\dashv$  |                | Н               | $\dashv$ | <u> </u>     | 7        |                | ╅                       | +                       | +   |  | $\dashv$  | $\dashv$                | $\dashv$  | +   | $\dashv$  | ŀ   |       | 125        | $\vdash$ | $\vdash$        | ⊢        | ⊢        | $\vdash$                            | -        | $\dashv$ | -        | $\dashv$ |
| <del></del> | 26          | Н        | $\dashv$     | $\dashv$   | $\dashv$ | $\dashv$ | $\dashv$  | -              | Н               | ᅱ        | ⊢            | 7        |                | +                       | +                       | ╁   | +  | $\dashv$  | $\dashv$                | $\dashv$  | +   | $\dashv$  | ŀ   |       | 126        | H        |                 | ┢        | ┝╌       | $\vdash$                            | _        |          | $\dashv$ | -        |
| <u> </u>    | 27          | Н        | +            | $\dashv$   | $\dashv$ | $\dashv$ | $\dashv$  | Н              | Н               | ᅥ        | $\vdash$     | 7        |                | ╁                       | ╁                       | ╁   | -+   | $\dashv$  | $\dashv$                | +   | +   | $\dashv$  | ŀ   |       | 127        |          |                 | ┢        | -        | -                                   |          |          |          |          |
|             | 28          | Н        | $\dashv$     | _  | 一        | $\dashv$ | $\dashv$  |                | $\vdash$        | 러        |              | 7        |                | +                       | ╅                       | +   | +  | $\dashv$  | $\dashv$                | 十   | +   | $\dashv$  | ŀ   |       | 128        | $\vdash$ | $\vdash$        | ┢        | $\vdash$ | $\vdash$                            | Н        |          | ᅥ        | _        |
| $\vdash$    | 29          | Н        | +            | ┪  | $\dashv$ | $\dashv$ | $\dashv$  | $\vdash$       | H               |          | <del> </del> | 7        | <del>5</del> + | +                       | +                       | +   | $\dashv$   | $\dashv$  | $\dashv$                | $\dashv$  | +   | $\exists$ | ŀ   |       | 129        | $\vdash$ |                 | H        | $\vdash$ | ┢                                   |          |          | ┪        |          |
|             | 30          | Н        | +            | $\dashv$   | $\dashv$ | $\dashv$ | $\dashv$  | Н              | Н               | 一        | <b> </b>     | 8        |                | +                       | +                       | $\top$  | $\dashv$   | $\dashv$  | $\dashv$                | +   | $\dashv$  | ┪         | ŀ   |       | 130        |          |                 | H        |          | $\vdash$                            |          |          |          |          |
| <b>-</b>    | 31          | H        | +            | ┪  | $\dashv$ | $\dashv$ | ┪         | Н              | H               | 一        | ┝            | 8        |                | +                       | +                       | $\top$  | $\dashv$   | 十   | $\dashv$                | $\dashv$  | -   | $\dashv$  | ŀ   |       | 131        | $\vdash$ | Н               | ┢        | ┢        | ┢                                   |          |          | 寸        | $\neg$   |
|             | 32          | $\vdash$ | 十            | 1  | $\dashv$ | 一        | $\dashv$  | $\vdash$       | $\vdash$        | 一        |              | 8        |                | $\top$                  | 十                       | $\top$  | T  | $\top$  | 十                       | 十   | +   | $\dashv$  | ŀ   |       | 132        |          |                 |          |          |                                     |          | $\dashv$ |          |          |
| $\vdash$    | 33          | Н        | 十            | 7  | $\dashv$ | 一        | $\dashv$  | Н              | Н               | $\dashv$ |              | 8        |                | +                       | $\top$                  | 十   | 7  | 十   | +                       | $\dashv$  | $\top$  | $\dashv$  | ı   |       | 133        |          |                 | Г        | T        |                                     | М        | $\dashv$ | $\neg$   |          |
|             | 34          | H        | 寸            | $\dashv$   | 一        | $\dashv$ | $\neg$    | П              | H               | $\neg$   | <b></b>      | 8        |                | †                       | ╅                       | 十   | $\top$   | $\dashv$  | 7                       | 十   | ╅   | $\dashv$  | f   |       | 134        | Г        | М               |          | Г        | Г                                   | М        |          | 寸        |          |
|             | 35          | П        | 寸            | $\dashv$   | _        | 寸        |           |                | H               | $\neg$   |              | 8        |                | $\top$                  | $\top$                  | $\top$  | 1  | 十   | 7                       | $\top$  | $\top$  | ┨         | Ì   |       | 135        |          |                 |          |          |                                     |          | $\neg$   |          |          |
|             | 36          | П        | 一            | ┪  | $\dashv$ | $\neg$   |           | П              | М               | $\neg$   |              | 8        |                | 1                       | $\top$                  | 1   | 7  | $\top$  | $\dashv$                | $\neg$  | 十   | ᆌ         | ı   |       | 136        |          |                 |          |          |                                     |          |          |          |          |
|             | 37          | П        | $\dashv$     | ┪  | $\dashv$ | $\dashv$ | $\dashv$  | П              | П               | $\dashv$ |              | 8        |                | 十                       | $\top$                  | ┪   | 7  | $\top$  | $\dashv$                | $\top$  | $\top$  | ┨         | Ì   |       | 137        |          | П               |          |          |                                     |          |          |          |          |
|             | 38          | П        | 寸            | $\dashv$   |          | 1        |           |                | П               |          |              | 8        |                | $\top$                  | $\top$                  | ╅   | T  | $\top$  | $\dashv$                | 十   | $\top$  | ┨         | Ì   |       | 138        |          |                 |          |          |                                     |          |          |          |          |
|             | 39          | П        | 寸            | 寸  | 寸        | 寸        | $\exists$ | П              | П               | $\neg$   |              | 8        | 9              | T                       | 十                       | $\top$  | T  |   | $\dashv$                | 7   |   | $\exists$ | Ī   |       | 139        |          |                 |          |          |                                     |          |          |          |          |
|             | 40          | П        | 寸            | 7  |          |          |           |                |                 | _1       |              | 9        | )              | Ī                       | ↥                       |   |  |   | _1                      |   |   |           | Ī   |       | 140        |          |                 | L        |          |                                     |          |          |          |          |
|             | 41          | П        | 7            |  |          | 丁        |           |                |                 |          |              | 9        | 1              | T                       | ╛                       |   |  |   | _                       | T   |   | ╗         | Ī   |       | 141        |          |                 |          |          |                                     |          |          |          |          |
|             | 42          |          |              | $\neg$   |          |          |           |                |                 |          |              | 9        | 2              | I                       | floor                   |   |  | $\Box$  |                         | $\Box$  | _[  |           | ſ   |       | 142        |          |                 |          |          |                                     |          |          |          |          |
|             | 43          |          |              | J  |          |          |           |                |                 |          |              | 9        |                | I                       | I                       | floor   | Ι  |   |                         | $\Box$  | floor   |           | Ī   |       | 143        |          |                 |          |          |                                     |          |          |          |          |
|             | 44          |          |              |  | ┚        | $\Box$   | $\Box$    |                |                 | $\Box$   |              | 9        |                | Ι                       | Ι                       | $oldsymbol{oldsymbol{oldsymbol{oldsymbol{\Gamma}}}$   |  | $oldsymbol{T}$  |                         | $oxed{\int}$                                      | $oldsymbol{oldsymbol{oldsymbol{oldsymbol{\Box}}}$ |           |     |       | 144        |          |                 |          |          |                                     |          |          |          |          |
|             | 45          |          |              |  | _]       |          |           |                |                 |          |              | 9        | 5              | Ι                       | Ι                       | $oldsymbol{oldsymbol{oldsymbol{oldsymbol{\Gamma}}}$   | floor  |   | $\prod$                 | $oldsymbol{oldsymbol{oldsymbol{oldsymbol{\Box}}}$ | $oldsymbol{oldsymbol{oldsymbol{oldsymbol{\Box}}}$ |           | Ī   |       | 145        |          |                 |          |          |                                     |          |          |          |          |
|             | 46          |          |              |  |          |          |           |                |                 |          |              | 9        |                | $oldsymbol{\mathbb{T}}$ | $oldsymbol{\mathbb{T}}$ | $oldsymbol{\mathbb{I}}$   | floor  |   | $\Box$                  | floor   | $oxed{T}$   |           |     |       | 146        |          |                 |          |          |                                     |          |          |          |          |
|             | 47          |          | $oxed{oxed}$ |  |          |          |           |                |                 |          |              | 9        |                | $\perp$                 | $\perp$                 | $oldsymbol{ol}}}}}}}}}}}}}}}$ | floor  | $oldsymbol{ol}}}}}}}}}}}}}}}$ | I                       | $\Box$  | $oldsymbol{\Gamma}$                               |           |     |       | 147        |          |                 |          |          |                                     |          |          |          |          |
|             | 48          |          | $\Box$       | $oldsymbol{ol}}}}}}}}}}}}}}}}$ | $\Box$   | $\Box$   | $\Box$    |                |                 |          |              | 9        |                | $\int$                  | $\perp \Gamma$          | $oldsymbol{ol}}}}}}}}}}}}}}}$ | $oldsymbol{ol}}}}}}}}}}}}}}}}$ | $\perp$   | $\prod$                 | $oldsymbol{\perp}$                                | $\perp \Gamma$                                    | J         |     |       | 148        |          |                 |          | 匚        |                                     |          | $\Box$   | $\Box$   |          |
|             | 49          |          | $\Box$       |  |          | $\Box$   |           |                |                 |          |              | 9:       | 9              | $\perp$                 | $\perp$                 | $oldsymbol{ol}}}}}}}}}}}}}} $ | $oxed{J}$  | $\Box$  | $oldsymbol{\mathbb{I}}$ | $oldsymbol{oldsymbol{oldsymbol{oldsymbol{\Box}}}$ | $oldsymbol{\perp}$                                | ┚         |     |       | 149        |          |                 |          |          |                                     |          |          |          |          |
|             | 50          | $\Box$   |              |  |          |          |           |                |                 |          |              | 10       | 0              | $\perp$                 | $\perp$                 |   | $\perp$  | $oldsymbol{\mathbb{I}}$   | $\prod$                 |   | $\perp$   | _]        | [   |       | 150        |          |                 |          |          |                                     |          |          |          |          |